

FRIEDMAN & BRUYA, INC.

ENVIRONMENTAL CHEMISTS

Date of Report: 10/03/02

Date Received: 09/19/02

Project: Metro Self Monitor, PO# M68717

Date Extracted: 09/30/02

Date Analyzed: 09/30/02

**RESULTS FROM THE ANALYSIS OF THE WATER SAMPLE
FOR TOTAL METALS BY
INDUCTIVELY COUPLED PLASMA (ICP)
(METHOD 6010)**

Results Reported as mg/L (ppm)

<u>Sample ID</u> Laboratory ID	<u>Chromium</u>	<u>Copper</u>	<u>Nickel</u>	<u>Zinc</u>
M68717 209138-01	0.90	1.1	0.91	<0.10
Method Blank	<0.05	<0.05	<0.05	<0.10

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QUALITY ASSURANCE RESULTS FROM TOTAL METALS BY INDUCTIVELY COUPLED PLASMA (ICP) (METHOD 6010)

Laboratory Code: 209200-01 (Duplicate)

Analyte	Reporting Units	Sample Result	Duplicate Result	Relative Percent Difference	Acceptance Criteria
Chromium	mg/L (ppm)	<0.05	<0.05	nm	0-20
Copper	mg/L (ppm)	<0.05	<0.05	nm	0-20
Nickel	mg/L (ppm)	<0.05	<0.05	nm	0-20
Zinc	mg/L (ppm)	0.83	0.84	1	0-20

Laboratory Code: 209200-01 (Matrix Spike)

Analyte	Reporting Units	Spike Level	Sample Result	% Recovery MS	% Recovery MSD	Acceptance Criteria	RPD (Limit 20)
Chromium	mg/L (ppm)	2	<0.05	95	93	80-120	2
Copper	mg/L (ppm)	2	<0.05	98	96	80-120	2
Nickel	mg/L (ppm)	4	<0.05	97	95	80-120	2
Zinc	mg/L (ppm)	2	0.83	100	100	80-120	0

Laboratory Code: Laboratory Control Sample

Analyte	Reporting Units	Spike Level	% Recovery LCS	% Recovery LCSD	Acceptance Criteria	RPD (Limit 20)
Chromium	mg/L (ppm)	2	100	96	80-120	4
Copper	mg/L (ppm)	2	100	96	80-120	4
Nickel	mg/L (ppm)	4	99	95	80-120	4
Zinc	mg/L (ppm)	2	107	105	80-120	2

nm - The analyte was not detected in one or more of the duplicate analyses. Therefore, calculation of the RPD is not applicable.

FRIEDMAN & BRUYA, INC.

ENVIRONMENTAL CHEMISTS

James E. Bruya, Ph.D.
Charlene Morrow, M.S.
Yelena Aravkina, M.S.
Bradley T. Benson, B.S.
Kurt Johnson, B.S.

3012 16th Avenue West
Seattle, WA 98119-2029
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FAX: (206) 283-5044
e-mail: fbi@isomedia.com

October 3, 2002

DUPLICATE COPY

INVOICE # 02ACU1003-2

Accounts Payable
Alaskan Copper Works
628 South Hanford
Seattle, WA 98134

RE: Project Metro Self Monitor, PO# M68717 - Results of testing requested by
Gerry Thompson for material submitted on September 19, 2002.

1 sample analyzed for Total Chromium, Copper, Nickel and Zinc
by Method 6010B @ \$80 per sample

\$ 80.00

Amount Due

\$ 80.00

FEDERAL TAX ID #(b) (6)

209138

SAMPLE CHAIN OF CUSTODY

ME 9/19/02

B12

Send Report To GREG Thompson
 Company ALASKAN Copper Works
 Address 628 S. Harvard St
 City, State, ZIP Seattle WA
 Phone # 206-382-8379 Fax # 206-382-4509

SAMPLERS (Signature)

PROJECT NAME/NO.

METRO SELF monitor

PO #

m68712

REMARKS

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TURNAROUND TIME

☐ Standard (2 Weeks)☐ RUSH

Rush charges authorized by:

SAMPLE DISPOSAL

☐ Dispose after 30 days☐ Return samples☐ Will call with instructions

Sample ID	Lab ID	Date Sampled	Time Sampled	Sample Type	# of containers	ANALYSES REQUESTED										Notes
						TPH-Diesel	TPH-Gasoline	BTEX by 8021B	VOCs by 8260	SVOCs by 8270	HFS	on cu n, n, n				
m68712	01	9/19/02	10:00	H ₂ O	1											

Friedman & Bruya, Inc.
 3012 16th Avenue West
 Seattle, WA 98119-2029
 Ph. (206) 285-8282
 Fax (206) 283-5044

SIGNATURE	PRINT NAME	COMPANY	DATE	TIME
Relinquished by: <u>(Signature)</u>	G. Thompson	ACW	11:23	9/19/02
Received by: <u>(Signature)</u>	Michael Edahl	P&B inc	12:00pm	9/19/02
Relinquished by:				
Received by:				

FRIEDMAN & BRUYA, INC.

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October 3, 2002

Gerry Thompson, Project Manager
Alaskan Copper Works
628 South Hanford
Seattle, WA 98134

Dear Mr. Thompson:

Included are the results from the testing of material submitted on September 19, 2002 from your Metro Self Monitor, PO# M68717 project. Any samples that may remain are currently scheduled for disposal in 30 days. If you would like us to return your samples or arrange for long term storage at our offices, please contact us as soon as possible.

We appreciate this opportunity to be of service to you and hope you will call if you should have any questions.

Sincerely,

FRIEDMAN & BRUYA, INC.



Michael Erdahl
Project Manager

Enclosures
ACU1003R.DOC